

Task Analysis Form

- STEP 1. Identify the major user tasks.
- STEP 2. Break tasks down into subtasks and specific steps.
- STEP 3. Identify frequency and priority of each step or subtask.
- STEP 4. Identify input and display requirements.

Below is a sample of a partial task analysis using an outline format.

Major User Tasks

In general the main task to be performed by anyone using the GRC intranet is to locate some web page they desire. Performing more specific tasks is within the domain of each specific web site connected to the intranet. The only exceptions are linking a page to the intranet or transporter. These 2 tasks were part of the intranet redesign.

- Task 1 Link a web page (site) to intranet
- Task 2 Link a web page (site) to transporter
- Task 3 Locate a web page

Major Task 1 – Link a web page or site to the intranet.

This is a critical task that is performed infrequently by web page curators. A curator may only perform this task once or twice each year.

Subtask 1 Identify the web page to be linked

- Step 1.1 Provide the url of the page to be linked
- Step 1.2 Provide a short name to be used when listing the page

Subtask 2 Identify the owner of the web page

- Step 2.1 Enter last name, first name of web page curator
- Step 2.2 Enter organization of web page curator
- Step 2.3 Enter phone number
- Step 2.4 Enter mailstop
- Step 2.5 Enter email

Subtask 3 Identify placement for web page

This subtask may be performed more than one time for each page to be linked. 90% of the time only a single location will be identified.

- Step 3.1 Select one of the main headings under which web page should be located
- Step 3.2 Select a subheading under which web page should be located

User Profile Form

STEP 1. Identify different user Types based on the work they perform and the different parts of the application they will be using. Performing a thorough task analysis will assist in this task.

Example:

- a. General users of varying backgrounds visiting sites for daily information (cafeteria menu).
- b. General users of varying backgrounds (technical, clerical, management) searching for specific job related information.
- c. General users searching for non-job related information on infrequent basis.
- d. Web site curators trying to link pages to intranet and transporter.

STEP 2. Identify specific criteria for each user Type that differentiates novice, intermediate and expert level users.

The table below is an example of some criteria that you may want to consider using.

User Type #1

User Trait	Novice	Intermediate	Expert
Computer experience <i>Depending on situation you may want to focus more on user experience with MAC, PC or UNIX.</i>	Less than 3 months	3 – 12 months	12+ months
Software experience <i>If a specific development software is being used this would be important. Web based vs. Windows based software.</i>	Internet use <1 month	Internet use 1 – 6 months	Internet use 6+ months
Similar software experience <i>If user has experience with other similar software it would impact their ability to use the new software being developed.</i>	Used at least 1 other similar software.	Used at least 2 similar software applications.	Used more than 2 other similar software applications.
Frequency of use <i>How often the user uses the computer or software is just as important as how long they have used it.</i>	1 – 2 times per month	1 – 2 times per week	Daily
Job/Task experience <i>Job experience can be broken down into specific tasks. User experience performing each task may be important.</i>	Less than 3 months	3 – 12 months	12+ months

Web Site Evaluation Checklist

Feedback	Always	Sometimes	Never	NOTES
It is always clear what is happening	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
All feedback is prompt	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Users are informed if a plug-in or browser version is required	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Users can give feedback via email or a feedback form	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Users can receive email feedback if necessary	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
If necessary, online help is available	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Consistency	Always	Sometimes	Never	NOTES
Only one word or term is used to describe any item	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Links match titles of the pages to which they refer	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Standard colors are used for links and visited links	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Terminology is consistent with general web usage	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Error Prevention and Correction	Always	Sometimes	Never	NOTES
Errors do not occur unnecessarily	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Error messages are in plain language	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Error messages describe what the problem is	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Error messages describe what action is necessary	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Error messages provide a clear exit point	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Error messages provide contact info for assistance, if needed	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Visual Clarity	Always	Sometimes	Never	NOTES
The layout is clear	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
There is sufficient white space	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
All images have ALT text assigned	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Unnecessary animation is avoided	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

Navigation	Always	Sometimes	Never	NOTES
There is a clear indication of the current location	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
There is a clearly identified link to the Home page	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
All major parts of the site are accessible from the Home page	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
If necessary, a site map is available	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Site structure is simple, with no unnecessary levels	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
If necessary, an easy-to-use search function is available	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Functionality	Always	Sometimes	Never	NOTES
All functionality is clearly labelled	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
All necessary functionality is available w/o leaving the site	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
No unnecessary plug-ins are used	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Control	Always	Sometimes	Never	NOTES
The user can cancel all operations	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
There is a clear exit point on every page	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Page size is less than 50Kb/page	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
All graphic links are also available as text links	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
The site supports the user's workflow	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
All appropriate browsers are supported	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Language	Always	Sometimes	Never	NOTES
The language used is simple	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Jargon is avoided	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

Pre Test Questionnaire

Name: _____ Org Code: _____

Job Title: _____ Phone: _____

1. How would you rate your experience as a computer user?
 - a. Novice / Beginner
 - b. Intermediate
 - c. Experienced
 - d. Expert
2. How often do you use the internet?
 - a. Less than once each week
 - b. A few times each week
 - c. Daily, less than 3 times
 - d. Daily, more than 3 times
3. How much time do you spend on the Glenn intranet?
 - a. Less than once each week
 - b. A few times each week
 - c. Daily, less than 3 times
 - d. Daily, more than 3 times
4. How much do you use the "Transporter" to navigate through the Glenn intranet?
 - a. Never, I don't know what it is.
 - b. Very seldom, only if I can't find something
 - c. Frequently
 - d. Almost always
5. What is LeWeb?
6. What does the GRC Home Page look like?
7. Describe the difference between the Internal Home Page and the External Home Page?

8. Looking at the Glenn Internal Home Page, please indicate whether you agree or disagree with the following statements: (circle your response)

		Completely Disagree	Mostly Disagree	Both	Mostly Agree	Completely Agree
1.	I read the What's New at Glenn items every day.	1	2	3	4	5
2.	I find it easy to locate information that I need.	1	2	3	4	5
3.	The category headings make sense to me.	1	2	3	4	5
4.	It is easy to navigate without getting lost.	1	2	3	4	5
5.	I can always find what I need when I use the "Transporter".	1	2	3	4	5
6.	The layout makes it easy to locate information.	1	2	3	4	5
7.	I clearly understand the difference between the internal and external Glenn pages.	1	2	3	4	5
8.	I know how to get a web site linked to the Glenn intranet.	1	2	3	4	5

9. What do you like best about the Glenn Internal Home Page?

10. What would you like to see changed?

11. Briefly describe what information/topics you would expect to find associated with the following headings:

About Me and Glenn	
Core Research	
Finance	
Information Depot	
Leader's View	
Support Services	

The Usability Process

You have been asked to participate in a usability evaluation of the Glenn internal web site. Usability evaluations seek to determine if the people who use the product can do so quickly and easily to accomplish their work. Evaluations are designed to solicit feedback from participants, focusing on areas of concern identified by the development team. Usability evaluations typically consist of several users performing prearranged tasks using the software. Each user session is generally videotaped so that it may be reviewed at a later time. We will be observing and measuring how effectively the software allows you perform the tasks requested of you.

Once all evaluation sessions are completed, we compile the feedback received from each participant, along with our notes. We then prepare a final analysis report and maybe a highlight tape, which we present to the development team for review. Our intent is to provide a base of information from which the developers can make decisions to resolve problem areas in the interface and the work process. We also note positive feedback from participants, to indicate those areas in which the design is successful.

It is important to remember that the software design is being evaluated, NOT you. In just a few moments you will be asked to perform some tasks using a software prototype. With your approval we would like to video tape the session so that we may review it later if necessary.

Do you have any questions?

Ask user to complete the Pre-Test questions.

Glenn Intranet Overview

The Glenn Intranet or Glenn internal web site provides employees of the Glenn Research Center access to information that is essential and/or useful to their jobs. The current internal home page is undergoing some changes intended to make information easier for employees to find. The development team has catalogued all of the web pages currently linked to the Glenn intranet into a reorganized list of subjects. We would like you to help us to evaluate the validity of the proposed groupings. Keep in mind that what you will be using is only a textual listing of the categories and sub-categories. It does not in any way reflect what the actual design or look of the new home page will be. It also does not contain any of the additional features that may be made available to assist users in locating information.

Do you have any questions?

The Setting

You are in your office and logged into the newly redesigned Glenn intranet. You will be asked to locate specific pieces of information. Beginning with the homepage provided attempt to navigate through the intranet using only the subject lists provided. Please try to "think aloud". The more we understand what you are thinking the better we will be able to design the system to meet your needs.

Do you have any questions?

This is a sample of the tracking sheet used for first usability test of taxonomy. Shaded areas indicated correct location. Numbers represent the user's attempts to locate the requested topic.

Usability Evaluation for WING - Tracking Sheet

Topic	1 About You and Glenn	Core Research	Finance	Inform Depot	2 Leader's View	Support Services	Comments
Visitor's Center	Health/Family	Aero	Buy It, Ship it	About the web	Mission/Goals	Computers	
	Leisure	Archives	Budget/Accntg	News	3 Public Relations	Connections	
	Money	Current Projects		Reference	Rules & Officers	Engineering	
	Safety	Science		Schedule It		Facilities/Bldgs	
	Work	Space		Study Room			

Topic	About You and Glenn	Core Research	Finance	1 Inform Depot	Leader's View	Support Services	Comments
What time the lab bus will arrive at your building today	Health/Family	Aero	Buy It, Ship it	About the web	Mission/Goals	Computers	
	Leisure	Archives	Budget/Accntg	News	Public Relations	Connections	
	Money	Current Projects		Reference	Rules & Officers	Engineering	
	Safety	Science		2 Schedule It		Facilities/Bldgs	
	Work	Space		Study Room			

Topic	1 About You and Glenn	3	Core Research	Finance	2 Inform Depot	Leader's View	Support Services	Comments
How to obtain a new badge.	Health/Family		Aero	Buy It, Ship it	About the web	Mission/Goals	Computers	Did Not Find
	Leisure		Archives	Budget/Accntg	News	Public Relations	Connections	
	Money		Current Projects		Reference	Rules & Officers	Engineering	
	Safety	4	Science		Schedule It		Facilities/Bldgs	
	Work		Space		Study Room			

Topic	1 About You and Glenn	Core Research	Finance	2 Inform Depot	4	3 Leader's View	Support Services	Comments
Telephone directory	Health/Family	Aero	Buy It, Ship it	About the web		Mission/Goals	Computers	
	Leisure	Archives	Budget/Accntg	News		Public Relations	Connections	
	Money	Current Projects		Reference	5	Rules & Officers	Engineering	
	Safety	Science		Schedule It			Facilities/Bldgs	
	Work	Space		Study Room				

The main categories that users selected on their first attempt to find a topic were logged on this form. This analysis form clearly showed which items users had trouble finding and provided the answer as to where users expected to find the item.

	Finance	Core Research	Corporate focus	Errands/Leisure	Workplace	Infrastructure	News/Events	Public affairs	Link or Button	Transporter Word	Did Not Find	Used help
Chief Inform Officer			3		3	1					2	
Job vacancy					8		1					
Computer Administrator						8 + ?						
Purchases < \$100K	9											
Cafeteria Menu			7		2							
Lab bus schedule					2	1	5				1	
Learning Center					8	1				lc		
ACT project		8 + ?										
Medical services				6	3							
Help Desk						5 + ???			1		2	
ISO procedures		1	4						4			
Safety Manual			1		8							
Visitor Center				1	1			7				
Research & Tech reports		7	1				1				1	
Link a web page						4 + ???			1		2	
Org listing			3		4		2				3	
Building managers							9					
Obtaining a new badge			1		3 + ???		1	1			1	
NASA Home page		1							4		4	
Fitness center				7	2							
Today @ Glenn							2		7			
Test Installations Div.		2	2		1	2 + ??				tid	1	
Space Shuttle GRC contr		8						1				
Personnel Forms-Pos desc					9							
VCIM		1			2	5 + ??						
Hazardous Chem Label form			1		7	1					1	
Employee Express	1			1	7							
Glenn Electronic forms			2		3	2				forms	2	
Locate a person					2	1			6			
Educ Pgms Office			2		3			4				
GRC external home page			1						6		2	
Search GRC for 'iso'							1		3	iso	4	
Request Transporter word						6		1 + Help			5	help
Graphics&Visual Lab		1			1							
How to use transporter						4			4		3	help
Data Systems						6					1	
Index						2			1		1	
	10	21	21	22	76	45	8	13	37	4	37	

Post Test Questionnaire

Name: _____ Org Code: _____

Job Title: _____ Phone: _____

Referring to the prototype categories you just evaluated, please indicate whether you agree or disagree with the following statements: (circle your response)

		Completely Disagree	Mostly Disagree	Slightly Disagree	Slightly Agree	Mostly Agree	Completely Agree
1.	I found it easy to locate the information that was requested.	1	2	3	4	5	6
2.	It is easy to navigate without getting lost.	1	2	3	4	5	6
3.	The category headings make sense to me.	1	2	3	4	5	6
4.	It is easier to find information than using the existing Home Page.	1	2	3	4	5	6
5.	I like the new categorization better than the current Home Page.	1	2	3	4	5	6
6.	I like the appearance of the new Home Page better than the existing Home Page.	1	2	3	4	5	6
7.	I used the Help feature and found it useful.	1	2	3	4	5	6

What is the name or acronym of the new Home Page? _____

Please provide any additional comments describing what you liked/disliked about the way the information was organized:

Pretest and Posttest Questionnaire Ratings

Pretest Ratings of LeWeb

User Profile Information

Read "What's New" every day
Clearly understand in/ext pages
Know how to get web site linked

Averages 1st Test	Averages 2nd Test
2.6	3.1
3.4	3.6
3	2.3
3.0	3.0

User Satisfaction Feedback

Easy to locate info that I need
Category headings make sense
Easy to navigate w/o getting lost
Find what I need using transporter
Layout makes easy to locate info

3.0	3.0
3.3	3.4
3.4	3.1
2.6	2.4
3.1	3.2
3.1	3.0

Users were asked to rate their level of agreement with the statements. The following rating scale was used:

1. Completely disagree
2. Mostly disagree
3. Both agree and disagree
4. Mostly agree
5. Completely agree

Results indicated a fairly neutral feeling toward the existing home pages.

Post Test Ratings of WING

User Satisfaction Feedback

Easy to locate info requested
Easy to navigate w/o getting lost
Category headings make sense
Easier to find info than LeWeb
Like new categories better

Averages Taxonomy Test	Averages 1st GUI Test
2.5	4.3
4.4	4.3
2.6	3.9
2.3	4.1
2.5	4.4
2.86	4.2

Users were asked to rate their level of agreement with the statements. The following rating scale was used:

1. Completely disagree
2. Mostly disagree
3. Slightly disagree
4. Slightly agree
5. Mostly agree
6. Completely agree

Additional Feedback on 2nd Test

Like appearance better than LeWeb
Used Help and found useful

4.8
4.5

Only 2 of 13 users gave any ratings indicating disagreement with the statements.

Usability Evaluation Analysis and Recommendations

Brief Overview of Results

Evaluators were mostly experienced computer and internet users that also use the Glenn intranet often. They do not frequently use the Transporter. The names LeWeb and GRC Home Page are synonymous to 80% of the users even though they are aware of the external home page. With only a few exceptions users are not overly pleased or displeased with the current internal home page. 7 of 9 users expressed considerable satisfaction with the design and usability of WING and rated it as being better than the current home page.

Efforts by the nine users to each locate 36 items resulted in a 90% success rate with 77% successfully being found on the first attempt. There were a handful of items that were more problematic than other items. Links located on the footer were most often overlooked. Buttons on the header were also underutilized. Images that represented links to the NASA home page and GRC external pages were also overlooked. Other links that proved to be difficult to locate were Organizational listings, Help Desk, Forms and TID.

With some minor relocation or addition of links and possibly providing more descriptive headings all of the problems can be successfully resolved. Refer to the recommendations section for details.

The Evaluators (9)

Summary:

Mostly intermediate or experienced computer users. One expert and no novices. Plenty of experience using internet with most using more than 3 times each day. Use of Glenn intranet varied from a few times each week to more than 3 times each day. Half of users frequently used transporter and other half very seldom.

Most users did not have clear understanding of internal vs. external home pages. Two had no idea of what LeWeb was. Only two accurately described the GRC Homepage as the external page.

<i>Level of experience</i>	Novice	0
	Intermediate	4
	Experienced	3
	Expert	2
<i>Internet Use</i>	Less than once/week	0
	Few times/week	1
	Daily less than 3 times	1
	Daily more than 3 times	7
<i>Glenn intranet use</i>	Less than once/week	0
	Few times/week	2
	Daily less than 3 times	2
	Daily more than 3 times	5
<i>Use transporter</i>	Never, don't know what it is	1
	Very seldom	5
	Frequently	3
	Almost always	0

What is LeWeb?

1. Glenn intranet.
2. Don't know.
3. Glenn internal web.
4. It's on homepage. See it immediately when I go to home page.
5. Lewis web admin.
6. Internal home page.
7. Don't know.
8. The website. (indicated the correct one)
9. GRC Home page.

Describe GRC Home page?

1. Current events, pointers to orgs, black background (Leweb).
2. Don't know.
3. Described internal.
4. NASA logo, black and orange, black background (Leweb)
5. Hanger picture.
6. External page with hangar picture for outside users.
7. Described internal.
8. Black, bad color, too dark (was referring to LeWeb)
9. Black background, highlighted colors (was referring to LeWeb)

Difference between internal and external?

1. Hanger on the external.
2. Described correctly.
3. No picture on internal.
4. External is brighter, for NASA Glenn functions, explains NASA space program.
5. I've never hit the GRC external home page site. (they described it in the previous question though).
6. Internal is specific for employees and external has general info for the public.
7. Don't know.
8. Black vs. Center's picture
9. External has hangar.

User Satisfaction using LeWeb (see attached Excel file for details)

Users were provided 8 different positive statements regarding their use of LeWeb. They were asked to rate each statement using the following scale:

- | | |
|-----------------------------|----------------------|
| 1 - Completely disagree | 4 - Mostly agree |
| 2 - Mostly disagree | 5 - Completely agree |
| 3 - Both agree and disagree | |

On the statements regarding ease of use of LeWeb the average overall score was 3.0 which ranked middle of the road (both agree and disagree). The two highest scores were obtained on the following statements:

1. The category headings make sense (3.4)
2. Layout makes it easy to locate information (3.2)

The two lowest scores were concerning successful use of the transporter and the layout.

1. I always find what I need when I use the transporter (2.4)
2. Find it easy to locate information I need (3.0)

There were a total of 32 individual scores out of 72 that were rated a 1 or 2 providing a negative response rate of 44%.

User Satisfaction using WING (see attached Excel file for details)

After completing the usability evaluation users were asked to rate similar statements regarding their use of WING. Some of the statements were direct comparisons of LeWeb and WING. A scale of 1 - 6 was used assigning the following values:

- | | |
|-------------------------|----------------------|
| 1 - Completely disagree | 4 - Slightly agree |
| 2 - Mostly disagree | 5 - Mostly agree |
| 3 - Slightly disagree | 6 - Completely agree |

On the positive statements regarding usability of WING the average score was 4.25 indicating overall slight agreement. On the positive statement regarding WING being better than LeWeb the rating was 4.4, still just slightly agreeing.

There were a total of 13 individual scores out of 63 that were rated a 1, 2, or 3 providing a negative response rate of 20%. All but one of these scores came from 2 individuals.

Use of WING name or acronym for Home Page

User input suggests that the current name of LeWeb is not well known. 25% of users did not know what LeWeb referred to. Six of eight users described the GRC Homepage incorrectly, mistaking it for LeWeb. This substantiates input from a previous usability test. Based on this feedback it would appear that using any sort of acronym or catchy name does not necessarily help in identifying the web site.

When asked, 7 of 9 users properly identified the new design as WING or Web Intranet @ Glenn. One user could not remember and one user referred to Today @ Glenn. One user expressed great concern regarding the use of the WING acronym. The user felt that anyone working in the Space directorates would be greatly offended. No conclusions can be drawn about whether or not the WING acronym will be successfully imprinted on the minds of the users. More than likely, this web site will still be considered to be the GRC HomePage just as its predecessor LeWeb.

Analysis and Recommendations

Overall performance was much improved from the previous usability tests. Approximately 90% of all items were found. Approximately 77% of all items were found on the first attempt. Any item in which more than one person selected an incorrect response is detailed below.

1. *Org Listing* --- 2 did not find. 4 went to Personnel to find.
Personnel, Leadership
Personnel, Leadership
Leadership
Personnel DNF
Personnel, Buildings & Facilities, DNF
Leadership
Connections & Comm., Personnel, Core Research, Leadership
Corporate Focus

Recommendation: A second level heading of "Organizations" containing the three organizational links is needed. Place the Organizations under Glenn Workplace.

2. *Chief Information Officer*--- 2 of 6 looked in Personnel. 1 did not find.

Recommendation: NONE

3. *Cafeteria Menu* --- 2 of 8 looked in Workplace.

Lab bus schedule --- 2 of 8 looked in Workplace. One other looked in infrastructure for transportation. 1 did not find.

Medical Services --- 3 of 8 looked in Workplace.

Fitness Center --- 2 looked in Workplace.

Recommendation: Change "Errands & Leisure" to "Employee Activities" or "Extracurricular Activities". Change "News & Events" to "News, Calendars, Schedules".

4. *Help Desk* --- 3 of 8 looked in Computers but did not see it. Four looked in Connections/Communications before looking in Computers. 1 did not find.

Recommendation: Change listed item to read "Help Desk (Intellicenter)". Place a link in the Connections/Communications sub menu as well as in Computers. Help desk provides help on more than just computers. Place a link to Help Desk on the Help Page.

5. *Link a web page* --- 2 did not find. 3 went to Computers, 2 went to Connections.

Request Transport word --- 6 looked in About the Web. 5 did not find.

How to Use Transport --- 3 did not find. 4 looked in About the Web.

Search --- 4 did not find. Most used Transporter to do search. After search button was moved 2 of 2 found it.

Recommendation: Change "About the Web" to "Web Services". Provide links for "Transporter Help" and "Transporter Request" and "Search GRC Web" on Web Services page. Incorporate a Transporter Request with the Add a Link form so users will do both at the same time. Provide button for Search at top of home page. Button should go to advanced search screen rather than use the transporter input field. The extra step will help to indicate that transporter is separate from Search. Remove link for advanced search option.

6. *VCIM* --- 5 looked in Computers and went to CSD to locate.

Recommendation: Put a link for VCIM on the Computers submenu.

7. *Badging* --- 3 could not find it even after going to Safety.

Recommendation: Need to mention Security as a second level menu. Maybe "Safety, Security & Environmental" or perhaps Environmental can be its own category.

8. *NASA Home page* --- 3 did not find the icon.

GRC External Home page --- 2 did not find.

Recommendation: Eliminate using the image as a link and place them on the drop down list of external links. OR Put a text label just above the images indicating the link.

9. *Test Installations Div* --- 2 looked in Core Research. 2 looked in Facilities and Buildings.

Recommendation: Need to find out from TID where they think they belong. Maybe need to provide a link from all three areas since they support facilities and engineers in doing aero research.

10. *Glenn Electronic forms* --- 3 looked in Workplace and 1 in Computers. 2 Did not find. Only 1 correct hit on first attempt.

Recommendation: Seems like Workplace is a better fit, but the sub headings are not appropriate. It is possible that it might be appropriate to assign its own button. Forms are used everyday across the center by many people. It probably would get as many hits as the Directory.

11. *Educational Pgms Off.* --- 3 looked in Personnel and 1 in Study Room.

Recommendation: If Educational Programs also offers some programs for employees they should be linked in the Personnel area in addition to the Partnerships.

12. Records Management page is not linked.

13. Request a link is not working.

Header Modifications

Suggest moving the Search button to the right, away from the Transporter. Provide a small Help button next to Transporter button that would be the Transporter Help options.

In order of priority these are the buttons that I would place on the header:

1. Search
2. Index
3. Help
4. Organizations
5. Today @ Glenn
6. Employee Directory

Other User Suggestions

User rollover help as you move cursor on subheadings.

Display one line description of contents beneath each subheading on second level pages.

Put Help Desk on main page.

Rename Corporate Focus heading.

Move Educational Programs Office to the Study Room.

If people don't know that ACT is Space then how would they ever find this project?

Job Briefings are announcements, why aren't they listed there?

Get rid of Errands and Leisure. We don't have leisure at the workplace.

The Power and Propulsion Office links to the money office not the research stuff. This web page should be by Finance.

The "Add your site to WING" doesn't make sense. Drop the "WING" reference.

Don't like the white background.

Change Personnel to Office of Human Resources (suggested by OHR employee).

News & Events heading doesn't make sense for Schedules.

Why is Office of Equal Opportunity Programs under Procedures?

Put all forms in one place.

Directory button should say Employee Directory - thought it was directory of web.

IIR Web Accessibility and User Experience Design Forum/ Jan. 24, 25th 2002
SESSION TITLE: Usability Methods to Ensure Success Of Your Web Site

Data Organizing Schemes				
Type	Example URL's			Recommendations: Use for
Alphabetic List	http://www.cuinfo.cornell.edu/CPL/Policies/			Lists, publications, titles, and collections.
Alphanumeric	http://www.aeaweb.org/journal/elclasjn.html			Preexisting taxonomies: ex. LOC, MESH
Index Browse	http://lii.org/			All sites; good for known item searches; limited use for children's sites
Audience	http://www.dell.com			Segregated content by age or purpose
Category	http://www.yahoo.com			Disparate or ambiguous content; limited use for children's sites
Chronological	http://www.zakon.org/robert/internet/timeline/			Limited – historical, time-related events
Functional	http://www.nasa.gov/			All sites; good for business
Geographical	http://www.nec.com/			International business; geographic information
Metaphor	http://disney.go.com/park/bases/playhousebase/today/flash/index.html			Children's sites – not recommended for other
Numeric	http://link.bubl.ac.uk/ISC2			Preexisting numeric taxonomies; school or DDC content
Organizational Chart	http://www.icann.org/general/icann-org-chart_frame.htm			Not recommended
Subject Heading	http://user1.stitch.edu/~csclib/web.html			LOC; library, reference and multidiscipline sites
Table of Contents	http://www.nlm.nih.gov/exhibition/phs_history/contents.html			All sites; good for large sites, groups of content, instructional, training
Thesaurus	http://www.foodsubs.com/			Large information systems with preferred terminology

Site/Information Design Checklist

Project Contacts:	Project Lead:	Project Acct: (charge code)
	Developer Lead:	
	Client details (industry, marketing, competitive sites):	Phone: Contact: Email
Project Scope:		
	Site available: <input type="checkbox"/> Internal <input type="checkbox"/> External <input type="checkbox"/> Both	Separate design for both: <input type="checkbox"/> Yes <input type="checkbox"/> No
	Intended audience:	Site goals:
	<input type="checkbox"/> Public <input type="checkbox"/> Employees <input type="checkbox"/> Industry partners <input type="checkbox"/> All	
	Notes:	
	Project goals:	
	Business processes addressed:	

Information Design:	Types of materials: <input type="checkbox"/> Reference (privacy, copyright) <input type="checkbox"/> Instructional (help, how-to) <input type="checkbox"/> Educational (manuals, learn) <input type="checkbox"/> Entertainment (games, music) <input type="checkbox"/> Historical/archival <input type="checkbox"/> Product descriptions (graphics, text) <input type="checkbox"/> Services (business area, consumer) <input type="checkbox"/> Contact (phone, email, mail) <input type="checkbox"/> News (marketing, industry) <input type="checkbox"/> Biographical <input type="checkbox"/> E-Commerce (shopping cart, security)	Site Type: <input type="checkbox"/> Company products/services <input type="checkbox"/> Company extranet <input type="checkbox"/> Company intranet <input type="checkbox"/> Subject specialty index <input type="checkbox"/> E-Commerce <input type="checkbox"/> Research <input type="checkbox"/> Educational <input type="checkbox"/> Children <input type="checkbox"/> Reference <input type="checkbox"/> News <input type="checkbox"/> Medical <input type="checkbox"/> Entertainment	
	Information Structure (navigational) <input type="checkbox"/> Browse/web <input type="checkbox"/> Classification (taxonomy) <input type="checkbox"/> Cluster/grid <input type="checkbox"/> Flowchart/sequence <input type="checkbox"/> Hierarchical <input type="checkbox"/> Navigational pointers <input type="checkbox"/> Alphabetical <input type="checkbox"/> Chronological/timeline	Notes:	
Elements :			
	<input type="checkbox"/> Search Engine <input type="checkbox"/> Internal <input type="checkbox"/> External <input type="checkbox"/> Security <input type="checkbox"/> Index (site map) <input type="checkbox"/> Site ID (logo) <input type="checkbox"/> Utilities (how-to, help) <input type="checkbox"/> Video <input type="checkbox"/> Audio	<input type="checkbox"/> Homepage <input type="checkbox"/> Footer (address, contacts) <input type="checkbox"/> Templates (page, header, footer) <input type="checkbox"/> Date field <input type="checkbox"/> Graphics <input type="checkbox"/> Forms <input type="checkbox"/> Chat/discussion <input type="checkbox"/> Database	
Existing Content:	Products: Subjects: Contacts:	Services: Departments: Locations:	